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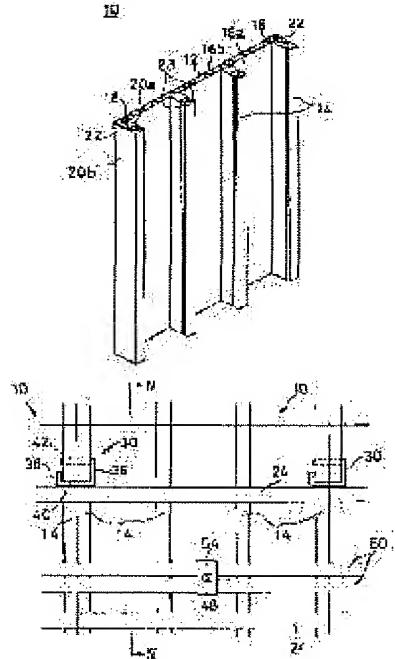
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(54) CONVERSION MOLD FOR CONCRETING



(57)Abstract:

PURPOSE: To obtain a mold excellent in strength, durability and workability by continuously forming the rib of a panel part and the rib of cross piece part, in the case of extrusion molding of a mold consisting of the panel part and the cross piece part having reinforcing ribs between plates.

CONSTITUTION: A mold 10 consisting of a panel part 12 having reinforcing ribs 18 between two plates and a cross piece part 14 having reinforcing ribs 22 is extrusively molded by synthetic resin integrally. In this time, the reinforcing ribs 18 of the panel part 12 and the reinforcing ribs 22 of the cross piece part 14

are molded consecutively. When the mold 10 is assembled by a reinforcing member 24,

a clip 30, a big lateral end material 50, etc., it is made so as not to produce any bending, etc. Thereby, a strong and durable mold can be produced easily.

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1. This document has been translated by computer. So the translation may not reflect the original precisely.
2. **** shows the word which can not be translated.
3. In the drawings, any words are not translated.

CLAIMS

[Claim(s)]

[Claim 1] A panel part and a stiffener part are the diversion molds for concrete placing by which extrusion molding was carried out by one. It is mutually parallel, and between two boards which are prolonged in a longitudinal direction and form a panel part, and two boards of said panel part, incline and it is formed, And it recovers from the 1st rib prolonged in said longitudinal direction, and the one side principal surface of said panel part, And a diversion mold for concrete placing provided with the 2nd rib that inclines, is formed between two boards of said stiffener part so that two boards which are prolonged in said longitudinal direction and form a stiffener part, and said 1st rib may be followed, and is prolonged in said longitudinal direction.

DETAILED DESCRIPTION

[Detailed Description of the Invention]

[0001]

[Industrial Application] Especially this invention relates to the diversion mold for concrete placing used for placing concretes, such as the foundation of a building, and a wall, about the diversion mold for concrete placing.

[0002]

[Description of the Prior Art] Between the two boards 2a and 2b, two or more ribs 3 of each other prolonged in a longitudinal direction are formed in parallel including the two boards 2a and 2b by which the conventional diversion mold 1 for concrete placing of each other shown in drawing 9 has been arranged in parallel. At the time of placing concrete, the stiffener 4 uses the nail 5 for the one side principal surface of the mold 1, and is attached to it, and the mold 1 is arranged in a prescribed position. And the mold 1 is fixed using ***** material, ***** material, etc. which are not illustrated, and concrete is placed in the space formed by the mold 1.

[0003]

[Problem(s) to be Solved by the Invention] There was a problem that flexural strength was weak, in the conventional mold 1. Since the integrity of a stiffener and a mold was bad, in order to give sufficient intensity, many stiffeners were needed, and the problem that it was bad also had workability conjointly with the trouble of a nailing operation. So, the main purpose of this invention is to provide the diversion mold for concrete placing which can secure sufficient intensity and can moreover improve workability.

[0004]

[Means for Solving the Problem] This invention is the diversion mold for concrete placing with which extrusion molding of a panel part and the stiffener part was carried out by one. It is mutually parallel, and between two boards which are prolonged in a longitudinal direction and form a panel part, and two boards of a panel part, incline and it is formed. And it is a diversion mold for concrete placing provided with the 2nd rib that inclines, is formed between two boards of a stiffener part so that the 1st rib prolonged in a longitudinal direction, two boards of a panel part which recover from the principal surface on the other hand, and are prolonged in a longitudinal direction, and form a stiffener part, and the 1st rib may be followed, and is prolonged in a longitudinal direction.

[0005]

[Function] Since extrusion molding of a panel part and the stiffener part is carried out by one, it is not necessary to attach a stiffener by a separated process. Since the 1st rib inclines and is formed between two boards of a panel part, comparatively large intensity can be obtained also in a transverse direction also to a lengthwise direction. And since the 2nd rib is formed between two boards of a stiffener part so that the 1st rib may be followed, even when the 2nd rib is reinforced and two molds are combined using a stiffener part by the 1st rib, the problem that it is pulled by the next mold and a stiffener part is transformed is not produced.

[0006]

[Effect of the Invention] According to this invention, sufficient intensity can be secured and, moreover, workability can be improved. Since extrusion molding of a panel part and the stiffener part is carried out by one, the bruise of a mold can be lessened compared with the conventional technology which had joined both using the nail, and the endurance of a mold can be improved.

[0007] The above-mentioned purpose of this invention, the other purposes, the feature, and an advantage will become still clearer from the detailed explanation of the following examples given with reference to drawings.

[0008]

[Example] The diversion mold 10 for concrete placing of this example shown in drawing 1 and drawing 2 consists of synthetic resins, such as polyvinyl chloride, polypropylene, or polycarbonate, and extrusion molding of the panel part 12 and the stiffener part 14 is carried out by one. Including the two boards 16a and 16b formed in the extrusion direction by extending for a long time, between the two boards 16a and 16b, two or more 1st ribs 18 prolonged in a longitudinal direction incline to the principal surface of the two boards 16a and 16b, and the panel part 12 is formed.

[0009] The stiffener part 14 recovers from the one side principal surface (surface of the board 16a) of the panel part 12, And including the two boards 20a and 20b formed in the longitudinal direction by extending, between the two boards 20a and 20b, it inclines so that the 1st rib 18 of the panel part 12 may be followed, and the 2nd rib 22 is prolonged in a longitudinal direction, and is formed at it. The male fitting 26 formed in the reinforcing member 24 (drawing 5) mentioned later and the fitting groove 28 into which it gets each other are extended and formed in the stiffener part 14 at a longitudinal direction.

[0010] Sizes, such as thickness of the panel part 12 and height of the stiffener part 14, are set as the same grade as the size of the plywood generally used widely or a stiffener. Therefore, the mold 10 of this example and the conventional plywood form can be mixed. For example, it can perform simply that the mold 10 compensates a lengthwise direction or a transverse direction with it by a plywood form for a while at the time of short measurement (short).

[0011] After being equipped with the reinforcing member 24 between the stiffener parts 14 with reference to drawing 3 and drawing 4 if needed at the time of placing concrete, the mold 10 is arranged in a prescribed position and two or more molds 10 are combined with a transverse direction using the clip 30. As the reinforcing member 24 is shown in drawing 5, the fitting groove 28 of the stiffener part 14 and the male fitting 26 which fits in each other are formed in the side of the fitting part 32 including

two or more fitting parts 32 which fit in between the stiffener parts 14. And each fitting part 32 is connected via the connecting part 34. Such a reinforcing member 24 is formed of injection molding of synthetic resins, such as polyvinyl chloride, polypropylene, or polycarbonate.

[0012]The clip 30 (drawing 3), The axis 42 formed in the same direction as the connecting part 40 by extending from the end of the 1st contact part 36 that contacts the stiffener part 14 side of one mold 10, the 2nd contact part 38 that contacts the stiffener part 14 side of the mold 10 of another side, the connecting part 40 which connects the 1st contact part 36 and the 2nd contact part 38, and the 1st contact part 36 is included. The interval from the tip of the 2nd contact part 38 to the axis 42 is set up more greatly than the length from the hole 44 formed in the stiffener part 14 to the end face of the stiffener part 14 so that drawing 6 may show well. When attaching the clip 30, first, the hole 44 is formed in the predetermined place of the stiffener part 14, and the axis 42 is inserted in the hole 44 (drawing 6). And after the 1st contact part 36 has been contacted by the stiffener part 14 side of one mold 10, as shown in drawing 7, the 1st contact part 36, the 2nd contact part 38, and the connecting part 40 rotate focusing on the axis 42. Then, as shown in drawing 3, the 2nd contact part 38 is contacted by the stiffener part 14 side of the mold 10 of another side, and the two stiffener parts 14 are combined.

[0013]As shown in drawing 4, the form tie 48 connected to the separator 46 penetrates the panel part 12, and is provided, and temporary fastening of the ***** material 50 is carried out using the form tie 48. When it equips with the reinforcing member 24 (drawing 5), there is few ***** material 50 and it is good. And the ***** material 50 is bound tight using the form tie 48 and the metal fittings 54, and the concrete 56 is placed in the space formed by the mold 10.

[0014]Since extrusion molding of the panel part 12 and the stiffener part 14 is carried out by one according to this example, it is not necessary to attach a stiffener by a separated process, and workability can be improved. The endurance of the mold 10 can be improved compared with the conventional technology which had attached the stiffener to the panel with the nail, and the number of times of diversion of the mold 10 can be increased. Since the 1st rib 18 and the 2nd rib 22 incline and are formed, sufficient intensity for a lengthwise direction and a transverse direction is securable. Since the 1st rib 18 of the panel part 12 and the 2nd rib 22 of the stiffener part 14 are formed continuously, Even when the 2nd rib 22 becomes a form reinforced by the 1st rib 18 and combines the two molds 10 with the clip 30, the problem that it is pulled by the next mold 10 and the stiffener part 14 is transformed is not produced.

[0015] Since a long thing can be formed by extrusion molding, the dislocation between both plates of a joint can be decreased and a result of a concrete face can be improved. the case where the concrete wall of an apartment, etc. are placed -- the height of a wall -- each story -- since it is the same, if the mold of the long thing suitable for it is prepared, the same mold 10 can be diverted to each story. Since each size is set up similarly to each size of a plywood panel and a stiffener, when the length of the mold 10 runs short, it can combine with a plywood panel easily. In this case, as shown in drawing 8, the stiffener 60 and the stiffener part 14 of the mold 10 which were attached to the plywood panel 58 are combined via the stiffener 62. That is, as the connecting part of the stiffener 60 and the stiffener part 14 is straddled, the stiffener 62 is arranged, and the stiffener 62, the stiffener 60, and the stiffener part 14 are fixed using the nail 64.

[Translation done.]

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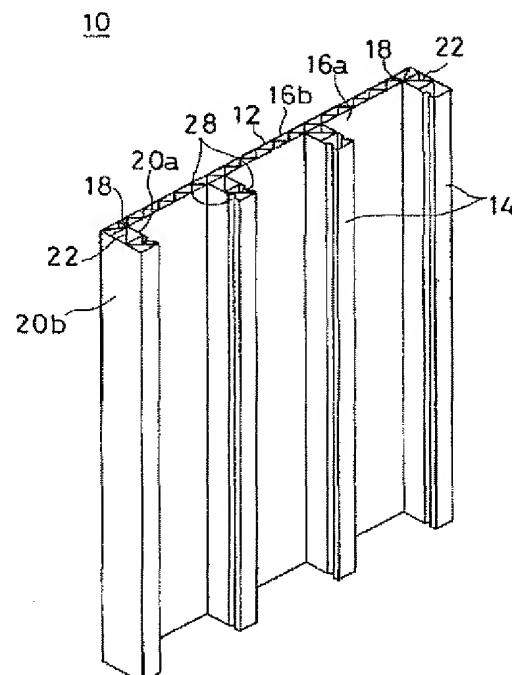
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(54)【発明の名称】コンクリート打込用転用型枠

(57)【要約】

【構成】パネル部12と桟木部14とが一体で押出成形される。パネル部12の2枚の板16aおよび16b間には、第1リブ18が傾斜して形成され、桟木部14の2枚の板20aおよび20b間には、第2リブ22が第1リブ18と連続するように傾斜して形成される。

【効果】桟木を別工程で取り付ける必要がないので、施工性を向上できる。また、第1リブ18を斜めに形成しているので、十分な強度を確保できる。そして、第2リブ22を第1リブ18に連続するように形成しているので、型枠10どうしを桟木部14を利用して結合した場合でも、隣りの型枠10に引かれて桟木部14が変形されるといった問題は生じない。



【特許請求の範囲】

【請求項 1】パネル部と桟木部とが一体で押出成形されたコンクリート打込用転用型枠であって、互いに平行でかつ長手方向に延びてパネル部を形成する2枚の板、前記パネル部の2枚の板間に傾斜して形成され、かつ前記長手方向に延びる第1リブ、前記パネル部の一方主面から立ち上がり、かつ前記長手方向に延びて桟木部を形成する2枚の板、前記第1リブに連続するように前記桟木部の2枚の板間に傾斜して形成され、かつ前記長手方向に延びる第2リブを備える、コンクリート打込用転用型枠。

【発明の詳細な説明】

【0001】

【産業上の利用分野】この発明はコンクリート打込用転用型枠に関し、特にたとえば建築物の基礎や壁などのコンクリートを打設するのに用いられる、コンクリート打込用転用型枠に関する。

【0002】

【従来の技術】図9に示す従来のコンクリート打込用転用型枠1は、互いに平行に配置された2枚の板2aおよび2bを含み、2枚の板2aおよび2b間には、長手方向に延びる複数のリブ3が互いに平行に形成されている。コンクリート打設時には、型枠1の一方主面に桟木4が釘5を用いて取り付けられ、型枠1が所定位置に配置される。そして、図示しない横端太材および縦端太材等を用いて型枠1が固定され、型枠1によって形成された空間にコンクリートが打設される。

【0003】

【発明が解決しようとする課題】従来の型枠1では、曲げ強度が弱いという問題点があった。また、桟木と型枠との一体性が悪いため、十分な強度をもたせるためには多くの桟木が必要となり、釘打ち作業の面倒さと相俟つて、施工性が悪いという問題点もあった。それゆえに、この発明の主たる目的は、十分な強度を確保でき、しかも施工性を向上できる、コンクリート打込用転用型枠を提供することである。

【0004】

【課題を解決するための手段】この発明は、パネル部と桟木部とが一体で押出成形されたコンクリート打込用転用型枠であって、互いに平行でかつ長手方向に延びてパネル部を形成する2枚の板、パネル部の2枚の板間に傾斜して形成され、かつ長手方向に延びる第1リブ、パネル部の一方主面から立ち上がり、かつ長手方向に延びて桟木部を形成する2枚の板、第1リブに連続するように桟木部の2枚の板間に傾斜して形成され、かつ長手方向に延びる第2リブを備える、コンクリート打込用転用型枠である。

【0005】

【作用】パネル部と桟木部とが一体で押出成形されるの

で、桟木を別工程で取り付ける必要はない。また、パネル部の2枚の板間には、第1リブが傾斜して形成されているので、縦方向にもまた横方向にも、比較的大きい強度を得ることができる。そして、桟木部の2枚の板間には、第1リブに連続するように第2リブが形成されるので、第1リブによって第2リブが補強され、2つの型枠を桟木部を用いて結合した場合でも、隣りの型枠に引っ張られて桟木部が変形されるといった問題は生じない。

【0006】

【発明の効果】この発明によれば、十分な強度を確保でき、しかも施工性を向上できる。また、パネル部と桟木部とが一体で押出成形されるので、両者を釘を用いて接合していた従来技術に比べて型枠の傷みを少なくでき、型枠の耐久性を向上できる。

【0007】この発明の上述の目的、その他の目的、特徴および利点は、図面を参照して行う以下の実施例の詳細な説明から一層明らかとなろう。

【0008】

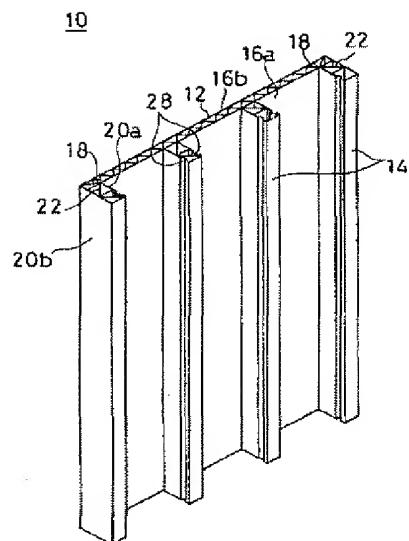
【実施例】図1および図2に示すこの実施例のコンクリート打込用転用型枠10は、ポリ塩化ビニル、ポリプロピレンまたはポリカーボネイト等の合成樹脂からなり、パネル部12と桟木部14とが一体で押出成形される。パネル部12は、押し出し方向に長く延びて形成された2枚の板16aおよび16bを含み、2枚の板16aおよび16b間には、長手方向に延びる複数の第1リブ18が2枚の板16aおよび16bの主面に対して傾斜して形成される。

【0009】桟木部14は、パネル部12の一方主面(板16aの表面)から立ち上がり、かつ長手方向に延びて形成された2枚の板20aおよび20bを含み、2枚の板20aおよび20bの間には、第2リブ22が、パネル部12の第1リブ18に連続するように傾斜して、かつ長手方向に延びて形成される。また、桟木部14には、後述する補強部材24(図5)に形成された嵌合凸部26と嵌まり合う嵌合溝28が長手方向に延びて形成される。

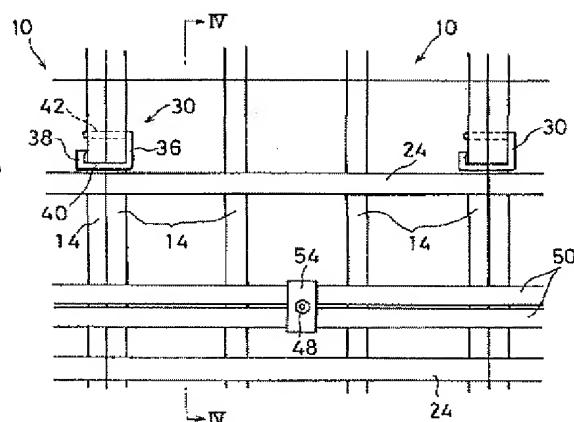
【0010】なお、パネル部12の厚みや桟木部14の高さ等の寸法は、広く一般に用いられている合板や桟木の寸法と同じ程度に設定される。したがって、この実施例の型枠10と従来の合板型枠とを混用することができる。たとえば、型枠10が縦方向または横方向に少し寸法不足(短い)とき、それを合板型枠で補うことが簡単にできる。

【0011】図3および図4を参照して、コンクリート打設時には、必要に応じて、桟木部14間に補強部材24が装着された後、型枠10が所定位置に配置され、複数の型枠10がクリップ30を用いて横方向に結合される。補強部材24は、図5に示すように、桟木部14間に嵌合される複数の嵌合部32を含み、嵌合部32の側面には、桟木部14の嵌合溝28と嵌まり合う嵌合凸部

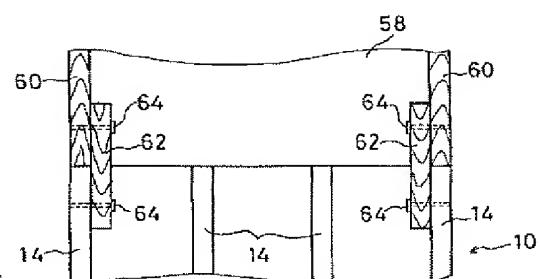
【図2】



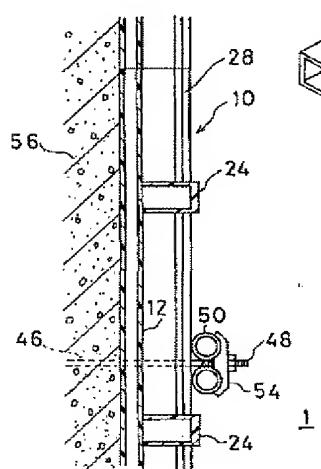
【図3】



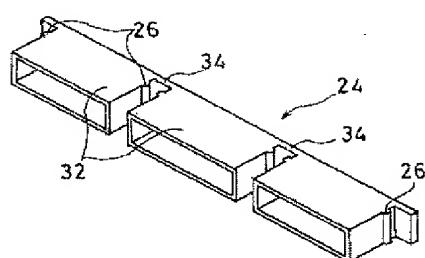
【図8】



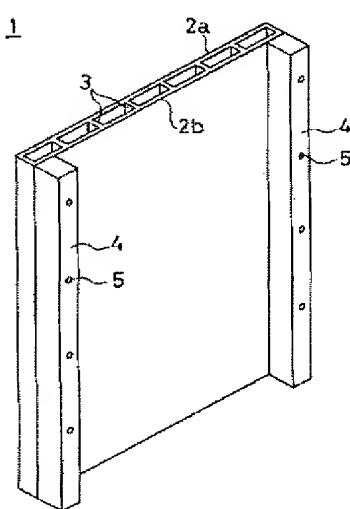
【図4】



【図5】



【図9】



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